



WATER MANAGEMENT DIVISION MONTHLY REPORT

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RESERVOIR OPERATION AND SYSTEM STATUS FOR DECEMBER 1999

HIGHLIGHTS – Cairo began the month at 17.7' and crested at 23.16' on the 20th before ending December at 8.2'. Normal stage for the month is 27 feet.

WEATHER – The weather during December continued warm but was generally wetter in places that were dry in November. Precipitation, however, was far below normal in Tennessee, North Carolina and Virginia, where it was generally less than 50 percent of normal, and below normal for eastern Kentucky, West Virginia and Pennsylvania. Precipitation was well above normal along most of the Ohio River and southern Indiana and Illinois. Temperatures averaged above normal for the month as the region was generally on the leading edge of major upper air troughs with southwesterly flows.

The following table summarizes temperature and precipitation for December:

TEMPERATURE AND PRECIPITATION – DECEMBER 1999

	TEMPERATURE		PRECIPITATION	
STATION	OBSERVED DEGREES F	DEPARTURE FROM NORMAL	OBSERVED INCHES	DEPARTURE FROM NORMAL
Pittsburgh, PA	34.6	+3.1	2.24	-0.68
Charleston, WV	38.2	+1.2	2.55	-0.84
Columbus, OH	34.6	+2.7	2.68	-0.18
Cincinnati, OH	34.8	+1.4	3.60	+0.45
Louisville, KY	38.1	+1.4	5.64	+2.00
Indianapolis, IN	34.6	+3.7	2.61	-0.73
Evansville, IN	37.3	+2.1	5.13	+1.46
Nashville, TN	43.7	+3.2	2.50	-2.11

STREAMFLOW -- Ohio River monthly average flows for December ranged from a low of 54 percent of normal at Paducah, KY to a high of 87 percent of normal at Pittsburgh, PA. Daily flows ranged from a low of 13 percent of normal at Evansville, IN to a high of 226 percent of normal at Huntington, WV.

The following table presents the flow data summary for December at the Ohio River Index Stations:

FLOW DATA – DECEMBER 1999

STATION	AVERAGE MONTHLY FLOW	PERCENT LONG-TERM NORMAL		
		MONTHLY	DAILY	
	CUBIC FEET/SECOND		HIGH	LOW
Pittsburgh, PA	32,696	87	210	35
Huntington, WV	62,548	78	226	25
Cincinnati, OH	69,903	70	202	25
Louisville, KY	78,226	72	188	14
Evansville, IN	76,645	57	149	13
Paducah, KY	133,610	54	100	24

RESERVOIRS -- December started with 3.6% utilization of the total system flood control storage and ended the month at 2.1%. System-wide augmentation storage increased from 86.2% at the beginning of the month to 88.9% by the end of the month. Significant flood storage utilization in excess of 25% occurred at none of the reservoir projects during December.

The following table depicts storage change by tributary reservoir subsystem for December:

CHANGE IN STORAGE TRIBUTARY-RESERVOIR SUBSYSTEM	(ACRE-FEET)
Allegheny-Monongahela-Beaver	-99,100
Muskingum-Little Kanawha-Hocking-Kanawha-Guyandotte	-26,900
Twelvepole-Big Sandy-Little Sandy-Scioto	-2,500
Little Miami-Licking-Mill Creek-Great Miami	-14,300

Kentucky-Salt-Green-Wabash	-133,000
Cumberland	-196,200
TOTAL	-472,000

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